Overland Storage

SnapSAN™ VMware vCenter Plug-in

User Guide

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Preface

This user guide explains how to install, setup, and use Overland Storage SnapSAN VMware vCenter Plug-in (VMware vCenter Plug-in) by working together with VMware vCenter Server, enables users to use VMware vSphere Client for binding and assigning logical disks on series disk array. This guide assumes that you are familiar with computer hardware, data storage, and network administration terminology and tasks. It also assumes you have basic knowledge of Internet SCSI (iSCSI), Serial-attached SCSI (SAS), Serial ATA (SATA), Storage Area Network (SAN), and Redundant Array of Independent Disks (RAID) technology.

Product Documentation and Firmware Updates

Overland Storage SnapSAN product documentation and additional literature are available online, along with the latest release of the software.

Point your browser to:

http://docs.overlandstorage.com/snapsan

Follow the appropriate link to download the **latest** software file or document. For additional assistance, search at http://support.overlandstorage.com.

Overland Technical Support

For help configuring and using your SnapSAN Manager Suite for Windows, search for help at:

http://support.overlandstorage.com/kb

You can email our technical support staff at techsupport@overlandstorage.com or get additional technical support information on the Contact Us web page:

http://www.overlandstorage.com/company/contact-us/

For a complete list of support times depending on the type of coverage, visit our web site at:

http://support.overlandstorage.com/support/overland_care.html

Conventions

Convention	Description & Usage
Boldface	Words in a boldface font (**Example**) indicate items to select such as menu items or command buttons.
Ctrl-Alt-r	This type of format details the keys you press simultaneously. In this example, hold down the **Ctrl** and **Alt** keys and press the **r** key.
NOTE	A Note indicates neutral or positive information that emphasizes or supplements important points of the main text. A note supplies information that may apply only in special cases—for example, memory limitations or details that apply to specific program versions.
IMPORTANT	An Important note is a type of note that provides information essential to the completion of a task or that can impact the product and its function.
CAUTION	A Caution contains information that the user needs to know to avoid damaging or permanently deleting data or causing physical damage to the hardware or system.
WARNING	A Warning contains information concerning personal safety. Failure to follow directions in the warning could result in bodily harm or death.
Menu Flow Indicator (>)	Words in bold font with a greater than sign between them indicate the flow of actions to accomplish a task. For example, **Setup > Passwords > User** indicates that you should press the Setup button, then the Passwords button, and finally the User button to accomplish a task.

Information contained in this guide has been reviewed for accuracy, but not for product warranty because of the various environments, operating systems, or settings involved. Information and specifications may change without notice.

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Chapter 1 Overview of VMware vCenter Plug-in

Overland Storage SnapSAN VMware vCenter Plug-in (VMware vCenter Plug-in) by working together with VMware vCenter Server, enables users to use VMware vSphere Client for binding and assigning logical disks on Overland Storage SnapSAN.

1.1 Functions of VMware vCenter Plug-in

VMware vCenter Plug-in allows users to operate the following functions of Overland Storage SnapSAN on vSphere Client.

- Disk array registration and list view.
- Displaying dependencies on hosts.
- Logical disk binding and assigning the logical disk to hosts.

1.2 System Configuration

An example of system configuration for using VMware vCenter Plug-in is shown below.

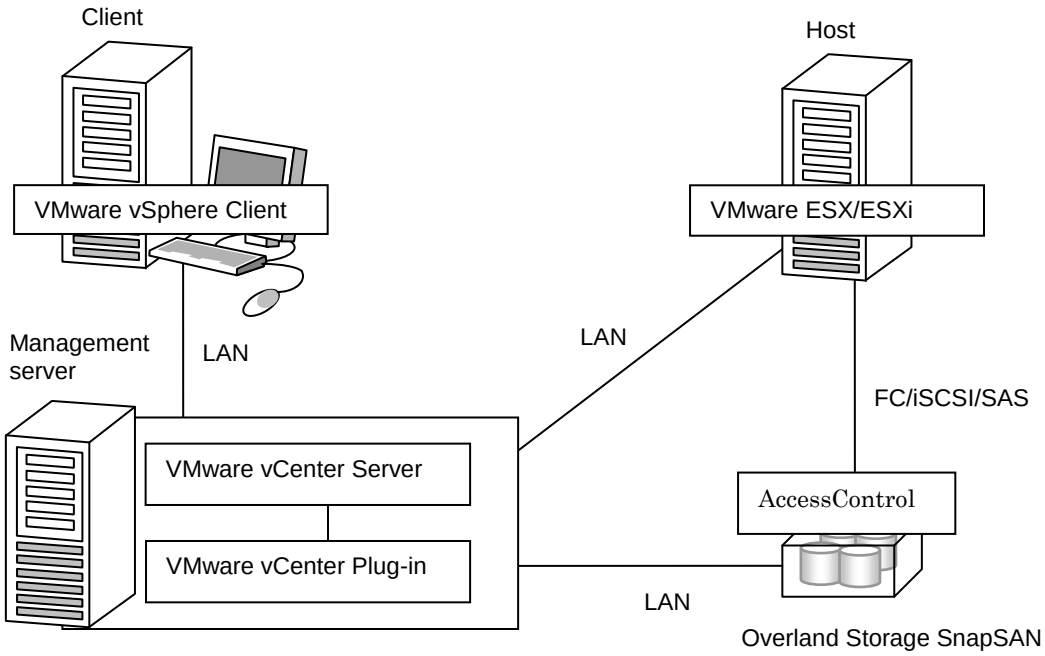


Figure 1-1 System Configuration

- Overland Storage SnapSAN

  Provides the hosts with the logical disks. The access from the hosts to the logical disks are contorlled by AccessControl.

- Host

  Operates virtual machines by using VMware ESX and ESXi.

  Connects to the Overland Storage SnapSAN via FC or iSCSI or SAS to use logical disks.

- Management server

  Manages hosts by using vCenter Server.

  Manages Overland Storage SnapSAN by installing VMware vCenter Plug-in.

- Client

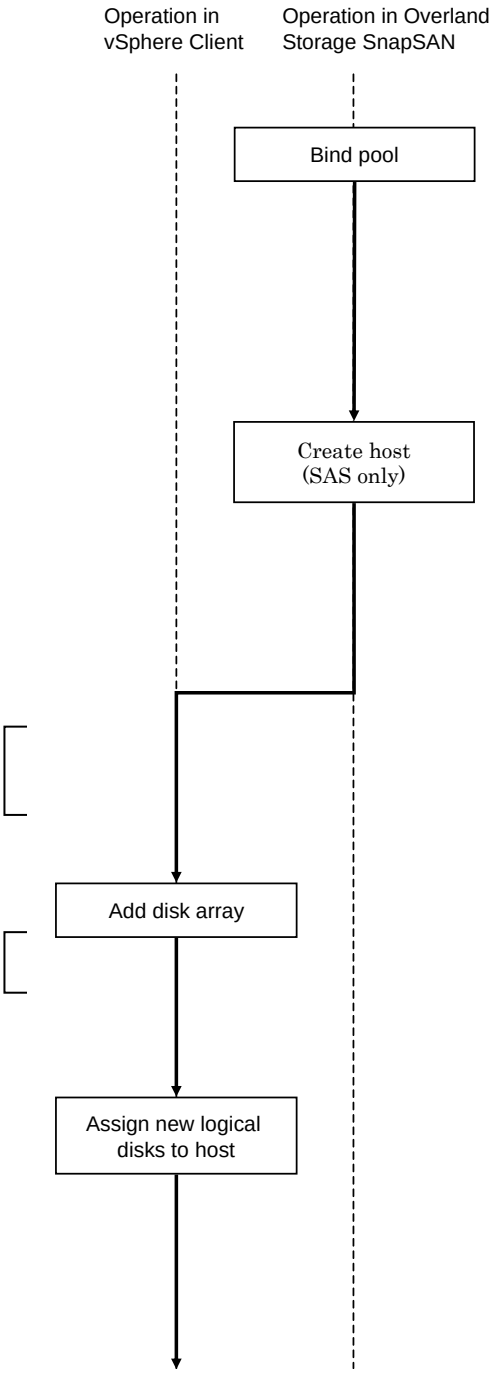
  Accesses vCenter Server from vSphere Client to allow for operations through GUI.

Chapter 2 Operating VMware vCenter Plug-in

This chapter provides procedures to operate Overland Storage by using VMware vCenter Plug-in.

2.1 Creating a Data Store

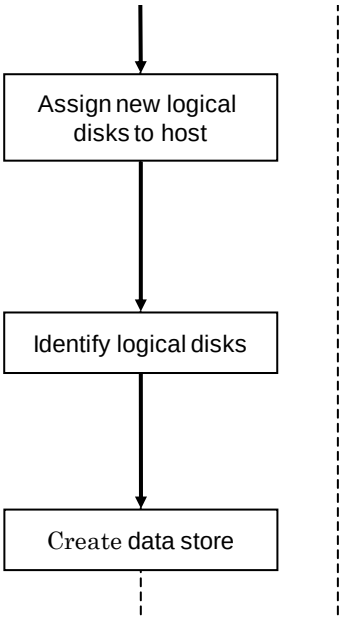
The section provides the procedure to create a data store by using VMware vCenter Plug-in.


Operation in vSphere Client
Operation in Overland Storage SnapSAN
Bind pool
Create host (SAS only)
Add disk array
Assign new logical disks to host

Bind a pool on Overland Storage SnapSAN. If there is already required free capacity in a pool on the Overland Storage SnapSAN, this step can be skipped. For details on binding a pool with GUI or ControlCommand, refer to *Overland Storage Software Configuration Setting Tool User's Manual (GUI) for SnapSAN 3000/5000*, and *Overland Storage Software Overland SnapSAN Manager Command Reference*, respectively.

Create hosts (LD set) for SAS to assign new logical disks to Overland Storage SnapSAN, and assign paths (ports or WWPNs) to the hosts (LD set). For details, see B.3 "LD Set Naming Conventions (SAS)". If hosts (LD set) for SAS already exist, this step can be skipped. For details about creating hosts with GUI or ControlCommand, refer to *Overland Storage Software Configuration Setting Tool User's Manual (GUI) for SnapSAN 3000/5000 and Overland Storage Software Overland SnapSAN Manager Command Reference* respectively.

Add the Overland Storage series SnapSAN to the data center by using vSphere Client. If the Overland Storage series SnapSAN has been added to the data center, this step can be skipped. For details, refer to 3.1.1 "Adding a SnapSAN".



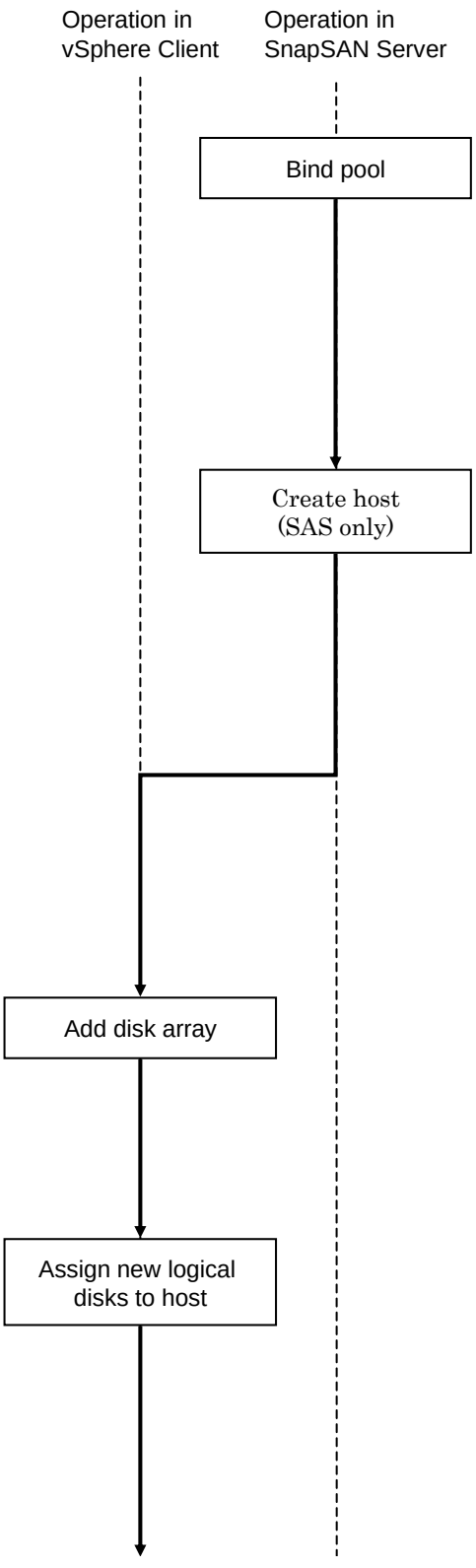
Assign new logical disks to hosts by using vSphere Client. For details, refer to 3.2.1 “Binding and assigning a new logical disk to a host”.

Perform a rescan of storage adapters by using vSphere Client to identify the new logical disks. For details, refer to information on how to operate vSphere Client.

Create a data store by using vSphere Client. For details, refer to information on how to operate vSphere Client.

2.2 Expanding a Data Store

The section provides the procedure to expand a data store by using VMware vCenter Plug-in.



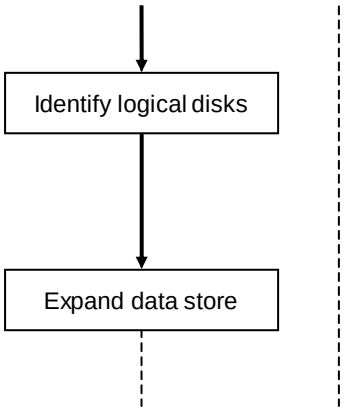
Bind a pool on Overland Storage SnapSAN. If there is already required free capacity in a pool on the Overland Storage SnapSAN, this step can be skipped.

For details on binding a pool with GUI or ControlCommand, refer to *Overland Storage Software Configuration Setting Tool User's Manual (GUI) for SnapSAN 3000/5000* and *Overland Storage Software Overland SnapSAN Manager Command Reference* respectively.

Create hosts (LD set) for SAS to assign new logical disks to Overland Storage SnapSAN, and assign paths (ports or WWPNs) to the hosts (LD set). For details, see B.3 "LD Set Naming Conventions (SAS)". If hosts (LD set) for SAS already exist, this step can be skipped. For details about creating hosts with GUI or ControlCommand, refer to *Overland Storage Software Configuration Setting Tool User's Manual (GUI) for SnapSAN 3000/5000*, and *Overland Storage Software Overland SnapSAN Manager Command Reference*, respectively.

Add the Overland Storage series SnapSAN to the data center by using vSphere Client. If the Overland Storage series SnapSAN has been added to the data center, this step can be skipped. For details, refer to 3.1.1 "Adding a SnapSAN".

Assign new logical disks to hosts by using vSphere Client. For details, refer to 3.2.1 "Binding and assigning a new logical disk to a host".

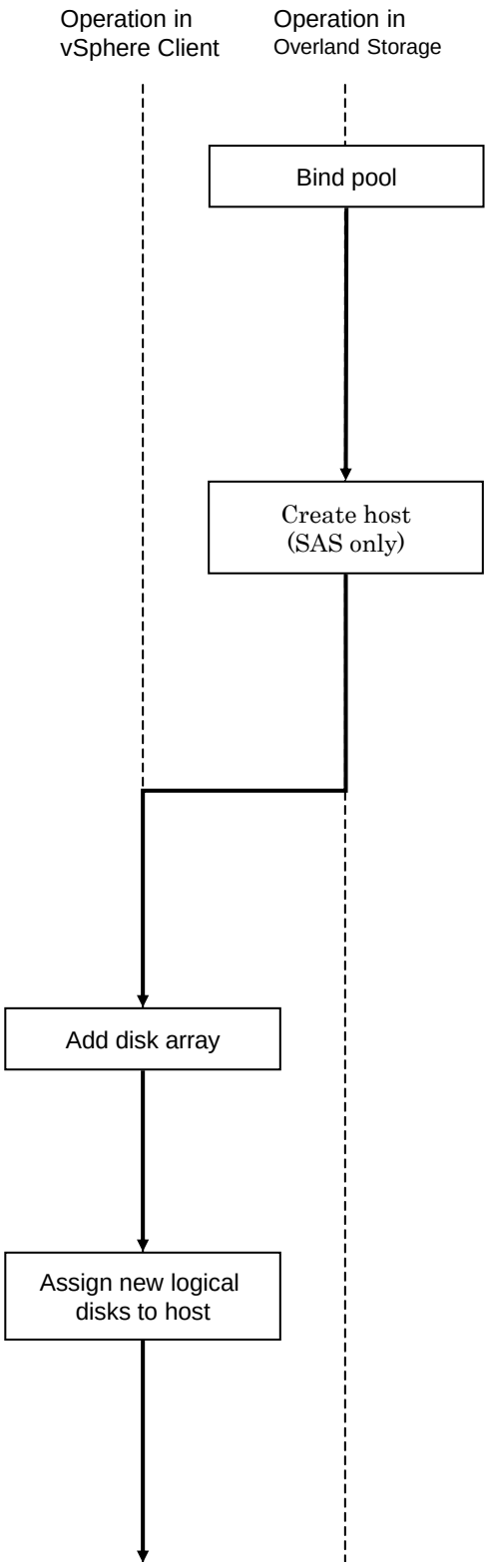


Perform a rescan of storage adapters by using vSphere Client to identify the new logical disks. For details, refer to information on how to operate vSphere Client.

Expand the data store by using vSphere Client. For details, refer to information on how to operate vSphere Client.

2.3 Raw Device Mapping

The section provides the procedure of raw device mapping for logical disk using VMware vCenter Plug-in.



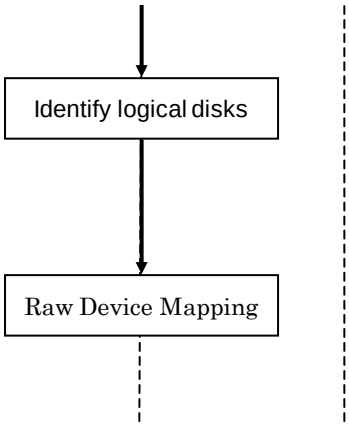
Bind a pool on Overland Storage SnapSAN. If there is already required free capacity in a pool on the Overland Storage SnapSAN, this step can be skipped.

For details on binding a pool with GUI or ControlCommand, refer to *Overland Storage Software Configuration Setting Tool User's Manual (GUI) for SnapSAN 3000/5000*, and *Overland Storage Software Overland SnapSAN Manager Command Reference*, respectively.

Create hosts (LD set) for SAS to assign new logical disks to Overland Storage SnapSAN, and assign paths (ports or WWPNs) to the hosts (LD set). For details, see B.3 "LD Set Naming Conventions (SAS)". If hosts (LD set) for SAS already exist, this step can be skipped. For details about creating hosts with GUI or ControlCommand, refer to *Overland Storage Software Configuration Setting Tool User's Manual (GUI) for SnapSAN 3000/5000*, and *Overland Storage Software Overland SnapSAN Manager Command Reference*, respectively.

Add the Overland Storage series SnapSAN to the data center by using vSphere Client. If the Overland Storage series SnapSAN has been added to the data center, this step can be skipped. For details, refer to 3.1.1 "Adding a SnapSAN".

Assign new logical disks to the host by using vSphere Client. For details, refer to 3.2.1 "Binding and assigning a new logical disk to a host".



Perform a rescan of storage adapters by using vSphere Client to identify the new logical disks. For details, refer to information on how to operate vSphere Client.

Perform raw device mapping of logical disks by using vSphere Client. For details, refer to information on how to operate vSphere Client.

Chapter 3 Using VMware vCenter Plug-in

This chapter describes how to work on windows of vSphere Client, which are provided through VMware vCenter Plug-in. The windows are shown when a user uses vSphere Client to log in vCenter Server on which VMware vCenter Plug-in is installed.

3.1 Disk Array Information Window

The Disk Array Information window allows you to view a list of SnapSAN Manager Storage disk arrays in a data center, add disk arrays, remove disk arrays, and configure the connection settings.

To show the Disk Array Information window, select a data center on vSphere Client and select the **SnapSAN Manager Storage** tab.

- **Disk Arrays**

(i) Disk Array Name

The individual name of the disk array

(ii) Status

One of the following representing the highest-level event among events that have occurred on the disk array and resources constituting the disk array is shown.

ready : ready (All the resources constituting the disk array are normal.)

attn. : attention (An event that can influence operations has occurred.)

fault : fault (An event that influences operations has occurred.)

The following additional information is shown as well.

・Shutdown status

(shutting down) : shutdown is ongoing.

(shutdown completed) : shutdown is completed.

(shutdown fail) : shutdown failed.

・Warning when there is no system volume

(NoSystemVolume) : there is no system volume.

* This warning is issued when the specified disk array has a pool but no system volume.

* The additional information telling there is no system volume, as mentioned above, is not displayed when the disk array has a serious problem.

(iii) Product ID

The model name of the disk array

(iv) Serial Number

The serial number of the disk array

(v) World Wide Name

The World Wide Name of the disk array

(vi) Number of Physical Disks

The total number of physical disks on the disk array

(vii) Number of Unused Physical Disks

The number of unused physical disks on the disk array

(viii) Number of Spare Disks

The number of physical disks on the disk array that are configured as hot spare

(ix) Number of Logical Disks

The number of logical disks bound on the disk array

(x) Floating IP Address (IPv4)

The IPv4 address set to the floating IP of the disk array

(xi) Floating IP Address (IPv6)

The IPv6 address set to the floating IP of the disk array

(xii) IP Address 0 (IPv4)

The IPv4 address set to the controller 0 of the disk array

(xiii) IP Address 0 (IPv6)

The IPv6 address set to the controller 0 of the disk array

(xiv) IP Address 1 (IPv4)

The IPv4 address set to the controller 1 of the disk array

(xv) IP Address 1 (IPv6)

The IPv6 address set to the controller 1 of the disk array

(xvi) IP address for Connecting

The IP address used to access the disk array from vCenter Plug-in

The Disk Array Information window shows the last updated time at its upper right. To refresh the information, click **Update**…

3.1.1 Adding a disk array

This section describes how to add an SnapSAN Manager Storage disk array to a data center.

When you click **Add Disk Array**, the window for adding a disk array appears.

Enter the connection IP address (IPv4 or IPv6), user name, and password and click **Test**.

The following window is shown when the connectivity test is successfully completed.

Check the information displayed on the window is correct and click **Save** to save the settings.

The following message is shown when the test fails.

Take action according to the information in the message.

3.1.2 Editing a disk array

This section describes how to configure the settings of an SnapSAN Manager Storage disk array in a data center.

Select the disk array whose settings you want to configure on a list of disk arrays, and click **Edit Disk Array**. The window to configure the disk array settings appears.

Configure the connection IP address (IPv4 or IPv6), user name, and password as necessary, and click **Test**.

The following window is shown when the connectivity test is successfully completed.

Check the information displayed on the window is correct and click **Save** to save the settings.

The following message is shown when the test fails.

Take action according to the information in the message.

3.1.3 Removing a disk array

This section describes how to remove an SnapSAN Manager Storage disk array from a data center.

Select the disk array you want to remove on a list of disk arrays, and click **Remove Disk Array**. The window to remove a disk array appears.

Check the information displayed on the window is correct and click **Perform** to remove the disk array.

3.2 Data Store Information Window

The Data Store Information window allows you to view the data stores and logical disks and assign new logical disks.

To show the Data Store Information window, select a host by using vSphere Client and select the **SnapSAN Manager Storage** tab. When **Logical Disk Bind and Assignment** is chosen, please click **Data Store Information**.

When a data store is selected on a list of data stores, the corresponding logical disks are listed.

• Data Stores

(i) Identification

(ii) Status

(iii) Device

(iv) Capacity

(v) Free

(vi) Type

(vii) Last Update

Each item of the data store list shows the information on data store that vCenter Server recognizes.

• Logical Disks

(i) Extent

Information about logical disk recognized by vCenter Server

(ii) Disk Array Name

The individual name of the disk array

(iii) Logical Disk Number

The number assigned to the logical disk

(iv) OS Type/Logical Disk Name

The OS and the name of the logical disk

(v) Status

Operation status of the logical disk represented by one of the following:

ready	: all of physical disks constituting the logical disk are normal
ready (formatting)	: formatting is ongoing (the logical disk can be used)
attn. (reduce)	: failing physical disks are isolated (degraded)
attn. (rebuilding)	: data is being rebuilt

attn. (copy back) : data is being written back from a spare disk (redundancy by RAID is retained)

attn. (preventive copy) : data is being copied to a spare disk (redundancy by RAID is retained)

attn.(unformatted) : waiting for logical formatting

attn.(formatting) : formatting is ongoing (logical disk not available)

attn.(format-fail) : format error

attn.(expanding) : logical expansion is ongoing

attn.(expand-fail) : logical expansion error

attn.(stop) : stopped

fault : function failure occurred

fault(media error) : media error occurred

fault(over quota) : quota has been exceeded

fault(over capacity) : free space is not enough

fault(system area fault) : logical failure occurred in the system volume

(vi) RAID

The RAID type of the logical disk

(vii) Capacity

The capacity of the logical disk

(viii) Actual Used Capacity

The allocated capacity of the virtual capacity logical disk

(ix) Pool Number

The number assigned to the pool to which the logical disk belongs

(x) Pool Name

The name of the pool to which the logical disk belongs

(xi) Capacity Allocation

The way capacity is allocated to the logical disk

virtual : virtual capacity logical disk

--- : actual capacity logical disk

(xii) LUN

The LUN of the logical disk

The Disk Array Information window shows the last updated time at its upper right. To refresh the information, click **Update**.

3.2.1 Binding and assigning a new logical disk to a host

This section describes how to bind a new logical disk in an SnapSAN Manager Storage disk array and assign it to a host.

When you click **Logical Disk Bind and Assignment** on the Disk Array Information window, the wizard is started and the window to select a disk array appears.

Select a disk array on which you want to bind a logical disk from the listed disk arrays and click **Next**. When other users are operating the disk array is, a new logical disk bind and assignment cannot be performed. Please operate it by waiting for completion of other users' operation.

The window to select a pool and to bind a new logical disk appears.

Select a pool on which you want to build a logical disk and specify its capacity. If the disk array has multiple interfaces to access hosts, select the type to interface with the hosts. And then click **Next**.

The window to select a host to which the logical disk is assigned appears.

You can assign the logical disk to either the selected host or all the hosts in the data center to which the selected host belongs. Note that in order to assign the logical disk to all the hosts in the data center to which the selected host belongs, the hosts must have the same interface type and the logical disk assigned to the hosts must have the same maximum value for the LUNs.

When SAS is used for the interface between the host and disk array, the host (LD set) needs to be created on the disk array in advance according to the naming conventions. For details about naming conventions for the SAS host (LD set), see B.3 “LD Set Naming Conventions (SAS)”. For details about how to operate with GUI or Command Reference, refer to *SnapSAN Manager Storage Software Configuration Setting Tool User’s Manual (GUI) for SnapSAN 3000/5000*, and *SnapSAN Manager Storage Software SnapSAN Manager Storage Manager Command Reference* respectively.

When you have selected the host to which the logical disk is assigned, click **Next**.

The window to confirm the settings appears.

Check the information displayed on the window is correct and click **Perform**.

The result of assignment of the new logical disk appears.

Figure 3-14 Window shown upon completion

After the completion of the new logical disk assignment, perform a rescan of storage adapters to identify new logical disks. And create/expand the data store, or perform raw device mapping of logical disks.

3.3 Hard Disk Information Window

The hard disk information window allows you to view hard disks that a virtual machine can use, and a list of logical disks on SnapSAN Manager Storage disk arrays.

To show the hard disk Information window, select a virtual machine on vSphere Client and select the **SnapSAN Manager Storage** tab.
When a data store is selected on a list of data stores, the corresponding logical disks are listed.

- **Hard Disks**

(i) Device Name
(ii) Type
(iii) File Path
(iv) Capacity
(v) Provisioning
(vi) Disk Mode
(vii) Compatibility Mode

The display item of the list of hard disks will display the information on the hard disk that are known to vCenter Server.

- **Logical Disks**

(i) Disk Array Name
The individual name of the disk array
(ii) Logical Disk Number
The number assigned to the logical disk
(iii) OS Type/Logical Disk Name
The OS and the name of the logical disk
(iv) Status
Operation status of the logical disk represented by one of the following:

ready	: all of physical disks constituting the logical disk are normal
ready (formatting)	: formatting is ongoing (the logical disk can be used)
attn. (reduce)	: failing physical disks are isolated (degraded)
attn. (rebuilding)	: data is being rebuilt
attn. (copy back)	: data is being written back from a spare disk (redundancy by RAID is retained)

attn. (preventive copy) : data is being copied to a spare disk (redundancy by RAID is retained)

attn.(unformatted) : waiting for logical formatting

attn.(formatting) : formatting is ongoing (logical disk not available)

attn.(format-fail) : format error

attn.(expanding) : logical expansion is ongoing

attn.(expand-fail) : logical expansion error

attn.(stop) : stopped

fault : function failure occurred

fault(media error) : media error occurred

fault(over quota) : quota has been exceeded

fault(over capacity) : free space is not enough

fault(system area fault) : logical failure occurred in the system volume

(v) RAID

The RAID type of the logical disk

(vi) Capacity

The capacity of the logical disk

(vii) Actual Used Capacity

The allocated capacity of the virtual capacity logical disk

(viii) Pool Number

The number assigned to the pool to which the logical disk belongs

(ix) Pool Name

The name of the pool to which the logical disk belongs

(x) Capacity Allocation

The way capacity is allocated to the logical disk

virtual : virtual capacity logical disk

--- : actual capacity logical disk

(xi) LUN

The LUN of the logical disk

(xii) Extent

Information about logical disk recognized by vCenter Server

The Hard Disk Information window shows the last updated time at its upper right. To refresh the information, click **Update**...

3.4 Plug-in Setting Window

The Plug-in setting window is used to configure the settings of connection from VMware vCenter Plug-in to vCenter Server. Configure the settings when there is a change in the vCenter Server account.

To show the Plug-in setting window, select **SnapSAN Manager Storage** under **Management** in the vSphere Client home window.

When SnapSAN Manager Storage is selected, the following window to set SnapSAN Manager Storage Pug-in appears.

Enter the user name and the password of the account to access vCenter Server and click **Test**. When the connectivity test completes successfully, click **Save** to save the settings.

The version information box shows the vCenter Server version and the vCenter Plug-in version.

The following message is shown when the test fails.

Take action according to the information in the message.

Appendix A Message List

A.1 Message List

“Connection failed to specified IP address.”

Check the IP address of a SnapSAN is correct, and there is not any problem in network environment.

“Connection failed to vCenter Server.”

The communication between VMware vCenter Plug-in and vCenter Server went wrong.

Check with the operational environment of VMware vCenter Plug-in whether abnormalities have occurred.

“Connection failed to vCenter Server. Please re-set up connection account.”

The account to access vCenter Server may have been changed.

Check the account to access vCenter Server.

“SnapSAN is under configuration process by others. The operation can't be performed.”

Other users are operating the SnapSAN.

Try again by waiting for completion of other users' operation.

“SnapSAN specification limit has been reached. The operation can't be performed.”

The number of logic disks of the SnapSAN, or the number of hosts, or the number of logic disks which can be assigned to the host has reached the maximum.

Check the status of the SnapSAN.

“SnapSAN with specified IP address already exists.”

Check the SnapSAN to register.

“SnapSAN with specified IP address isn't supported.”

The SnapSAN of the specified IP address is not a SnapSAN which VMware vCenter Plug-in is supporting.

“Failed to get SnapSAN information.”

Check with the operational environment of VMware vCenter Plug-in whether abnormalities have occurred.

“Failed to get information.”

Check with the operational environment of VMware vCenter Plug-in whether abnormalities have occurred.

“Failed to get pool information.”

Check with the operational environment of VMware vCenter Plug-in whether abnormalities have occurred.

“Failed to remove SnapSAN information.”

Check with the operational environment of VMware vCenter Plug-in whether abnormalities have occurred.

“Failed to save SnapSAN information.”

Check with the operational environment of VMware vCenter Plug-in whether abnormalities have occurred.

“Host(LD Set) which to operate has not been created at SnapSAN. Please create the host(LD Set) previously at the SnapSAN. ”

Create host (LD set) for SAS on the SnapSAN, and assign SAS path (port or WWPN) to the host (LD set). For details, see B.3 “LD Set Naming Conventions (SAS)”. For details about how to operate with GUI or Command Reference, refer to *SnapSAN Manager Storage Software Configuration Setting Tool User’s Manual (GUI) for SnapSAN 3000/5000* and *SnapSAN Manager Storage Software SnapSAN Manager Storage Manager Command Reference* respectively.

“If the interface of host and SnapSAN does not match, you can not select the SnapSAN. Please check the interface. ”

Check the interface of the host and the SnapSAN.

“Incorrect username/password.”

Check the username/password of the SnapSAN.

“IP address is invalid.”

Input correct IP address.

“Login failed. Incorrect username/password.”

Check the username/password of vCenter Server.

“Password is invalid.”

Input correct password.

“Session has been disconnected. The information will be updated. ”

Because the session has been disconnected, the information will be obtained again.

“Specified pool is the state of rotation stop. The operation can't be performed.”

The selected pool is the state of rotation stop by the power saving function.

Please cancel the state of rotation stop by using SnapSAN Manager Storage Manager.

“Specified user isn't allowed to perform configuration setting of SnapSAN.”

Specify the administrator user of SnapSAN.

“The following cases, the host (LD Set) on which to operate at the SnapSAN can not be uniquely identified. The assignment of new logic disk can not be continued.

・The interface of the host and the SnapSAN is SAS

And

・The name of the host without the domain part is more than 17 characters, or the name of the host is IPv6 address.”

VMware vCenter Plug-in does not support assignment of new logical disk to a host that meets the conditions described above.

“The operation can't be performed, because the host information related to the SnapSAN has been locked.”

Operation to the host is locked.

Unlock the operation to the host by using SnapSAN Manager Storage Manager.

“There is no SnapSAN can be manipulated. Please check the status of the SnapSAN. ”

There is no SnapSAN allowing assignment of new logical disk to host. Check the status of the registered SnapSANs. If no SnapSAN has been registered, add a SnapSAN.

“Unexpected error occurred.”

Check with the operational environment of VMware vCenter Plug-in whether abnormalities have occurred.

“User name is invalid.”

Input correct username.

Appendix B Notes

B.1 Considerations of Microsoft Internet Explorer 6 Installation Environment

In an environment with Microsoft Internet Explorer 6 is installed, you may break the appearance of the window vSphere Client provided by VMware vCenter Plug-in.

B.2 LD Set Naming Conventions (FC/iSCSI)

With FC or iSCSI connection, LD set is automatically created when a new logical disk is assigned to the host. An LD set created in a SnapSAN Manager Storage. SnapSAN is named according to the following conventions.

(i) The LD set platform is fixed to “LX”.

(ii) The host name or IP address recognized by vCenter Server is retrieved.

(iii) When the character string has more than 16 characters, characters after the 16th character are truncated.

(iv) Characters other than alphanumeric characters are converted to “-“.

(v) When the LD set name defined by performing Step (i) through (iv) overlaps with any existing LD set name, the character string is modified according to the following rules.

A) If there are less than 16 characters in the character string, a character is added to the end of the character string. The character to be added is selected from “G” through “Z” in alphabetical order.

B) If the character string has 16 characters, the last character is replaced by a character from “G” through “Z” in alphabetical order.

(vi) If the name still overlaps even after performing Step (v), the name will be: “LX:VC_HOST_XXXX”(A non-overlapping number from 0000 through 9999 is used for XXXX in numerical order.)

B.3 LD Set Naming Conventions (SAS)

With SAS connection, a host (LD set) needs to be created on the SnapSAN in adavance according to the naming conventions. In case the host name has 17 characters or more not including characters of the domain part, or the host name matches the IPv6 address, VMware vCenter Plug-in does not support assignment of new logical disk to the host.

(i) The LD set platform should be “LX”.

(ii) The LD set name should be host name (excluding the domain part) or IP address recognized by vCenter Server. Characters other than alphanumeric characters should be replaced with a hypen "-".

E.g.)

- If the host name is "DBServer.domain.co.jp", the LD set name should be set to "DBServer".
- If the host name is "192.168.0.1", the LD set name should be set to "192-168-0-1".

B.4 Notes on VMware vCenter Plug-in Functions

VMware vCenter Plug-in provides functions to only bind logical disks and asisgn the logical disks to the host. To unbind logical disks or unassign logical disks from the host, use SnapSAN Manager.

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